

Ref #	Hits	Search Query	DBs	Default Operator	Plurals	Time Stamp
L1	38567	"175"/\$.ccls.	US-PGPUB; USPAT; USOCR	OR	ON	2005/12/06 12:05
L2	25352	"175"/\$.ccls. and (bor\$4 drill\$4)	US-PGPUB; USPAT; USOCR	OR	ON	2005/12/06 12:06
L3	9373	"175"/\$.ccls. and @ad<"19991001"	US-PGPUB; USPAT; USOCR	OR	ON	2005/12/06 12:06
L4	18	"175"/\$.ccls. and @ad<"19991001" and "N-1"	US-PGPUB; USPAT; USOCR	OR	ON	2005/12/06 12:12
L5	28	"175"/\$.ccls. and @ad<"19991001" and square adj (figure hole polygon\$4)	US-PGPUB; USPAT; USOCR	OR	ON	2005/12/06 13:10
L6	9	"4059163"	US-PGPUB; USPAT; USOCR	OR	ON	2005/12/06 13:06
L7	13	"4074778"	US-PGPUB; USPAT; USOCR	OR	ON	2005/12/06 13:06
L8	6	"175"/\$.ccls. and @ad<"19991001" and triangul\$4 adj (figure hole polygon\$4)	US-PGPUB; USPAT; USOCR	OR	ON	2005/12/06 13:11
L9	7	"175"/\$.ccls. and @ad<"19991001" and triang\$4 adj (figure hole polygon\$4)	US-PGPUB; USPAT; USOCR	OR	ON	2005/12/06 14:33
L10	14	("1241176" "2586084" "2976027" "3036821" "3199496" "3771501" "3922120" "RE26383").PN.	US-PGPUB; USPAT; USOCR	OR	ON	2005/12/06 14:31
L11	1	"175"/\$.ccls. and @ad<"19991001" and (triang\$4 suar\$4) adj (figure hole polygon\$4) and ("5" five pentigon\$4) adj (bor\$4 drill\$4 cutte\$4 head bit)	US-PGPUB; USPAT; USOCR	OR	ON	2005/12/06 14:37
L12	34	"175"/\$.ccls. and @ad<"19991001" and (triang\$4 suar\$4) adj (figure hole polygon\$4)	US-PGPUB; USPAT; USOCR	OR	ON	2005/12/06 14:38
L13	1	"175"/\$.ccls. and @ad<"19991001" and (triang\$4 suar\$4) adj (figure hole polygon\$4) and pentagon\$4	US-PGPUB; USPAT; USOCR	OR	ON	2005/12/06 14:45

L14	2	lobed same cutting same polygonal same square	US-PGPUB; USPAT; USOCR	OR	ON	2005/12/06 14:45
S1	157	(drill drilling boring) and (polygonal circle) and (revolve around) and "angular velocity"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2005/01/10 14:14
S2	102	(drill drilling boring) and (polygonal circle) and (revolve around) and "angular velocity" and @ad < "19991001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/19 14:20
S3	0	(drill drilling boring) and (polygonal circle) and (revolve around) and "703"/\$.ccls	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/03/18 13:03
S4	831	(drill drilling boring) and (polygonal circle) and (revolve around) and (simulate simulating simulation)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/03/18 12:57
S5	6452	((703/\$)).CCLS.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/03/18 13:08
S6	78	(drill drilling boring) and (polygonal circle hole figure polygon graphic) and (revolve around) and (((("703"/\$)).CCLS.)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/03/18 13:09
S7	19	(drill drilling boring) and (polygonal circle hole figure polygon graphic) and (revolve around) and (((("703"/\$)).CCLS.) and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/14 15:24
S8	6071	(drill drilling boring) and geometry and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/03/29 10:38
S9	35	(drill drilling boring) adj geometry and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/03/28 12:16

S10	83	(drill drilling boring) and (polygonal circle) and (revolve around) and "angular velocity" and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/03/28 12:12
S11	29	"6527068".pn. "6021377".pn. "6095262".pn. "6290006".pn. "6213225".pn. "5864058".pn. "5787022".pn. "6401839".pn. "4408671".pn. "5950747".pn. "6412577".pn. "6516293".pn. "4815342".pn. "6349595".pn. "6241034".pn.	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/03/28 12:19
S12	70	(drill drilling boring) and Geometry and (polygonal circle) and (revolve around) and "angular velocity"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/03/29 09:17
S13	2	(drill drilling boring) adj Geometry and (polygonal circle) and (revolve around) and "angular velocity"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/03/29 09:18
S14	61	(drill drilling boring) adj Geometry	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/03/29 09:19
S15	33	((703/10).CCLS.) and (drill drilling boring)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/03/29 09:31
S16	110	(703/10).CCLS.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/04/19 12:05
S17	28	((703/10).CCLS.) and @ad < "19991001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/03/29 10:00
S18	2151	(drill drilling boring) and geometry and (figure graphic) and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/03/29 10:39

S19	626	(drill drilling boring) and geometry and (figure graphic) and model and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/03/29 10:40
S20	268	(drill drilling boring) and geometry and (figure graphic) and model and @pd < "19981001" and radius	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/03/29 10:40
S21	235	(drill drilling boring) and geometry and (figure graphic) and model and @pd < "19981001" and radius and diameter	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/03/29 10:41
S22	535	(drill drilling boring) and geometry and (figure graphic) and model and @pd < "19981001" and (radius diameter)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/03/29 10:41
S23	533	(drill drilling boring) and geometry and (figure graphic) and model and @pd < "19981001" and (radius diameter) and (first second center)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/03/29 10:42
S24	131	(drill drilling boring) and geometry and (figure graphic) and model and @pd < "19981001" and (radius diameter) and (first second center) adj (hole point position)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/03/29 10:50
S25	9	(drill drilling boring) and geometry and (figure graphic) and model and @pd < "19981001" and (radius diameter) and (first second center) adj (hole point position) and angular adj velocity	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/03/29 10:43
S26	79	(drill drilling boring) and geometry and (figure graphic) and model and @pd < "19981001" and (radius diameter) and (first second center) adj (hole point position) not mirror	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/03/29 10:51
S27	79	(drill drilling boring) and geometry and (figure graphic) and model and @pd < "19981001" and (radius diameter) and (first second center) adj (hole point position) not mirror not polution	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/03/29 10:51

S28	75	(drill drilling boring) and geometry and (figure graphic) and model and @pd < "19981001" and (radius diameter) and (first second center) adj (hole point position) not mirror not pollution	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/13 08:49
S29	74	(drill drilling boring) and geometry and (figure graphic) and model and @pd < "19981001" and (radius diameter) and (first second center) adj (hole point position) not (mirror pollution combustion)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/03/29 10:56
S30	74	(drill drilling boring) and geometry and (polygon figure graphic) and model and @pd < "19981001" and (radius diameter) and (first second center) adj (hole point position) not (mirror pollution combustion)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/03/29 10:57
S31	14	(n-polygon n-polygonal) and curve	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/03/29 10:58
S32	64	(n-polygon n-polygonal) and (curve figure polygon graphic drawing hole boring drill drilling)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/03/29 10:59
S33	2	spirograph and drill	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/06 12:09
S34	62	spirograph	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/06 12:12
S35	8	spirograph and surround\$	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/06 12:13
S36	1	"angular velocity" and (spirograph "spiro graph" "spiro-graph")	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/07 12:58

S37	789	(drill\$ boring) and spiral and restriction	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/13 08:41
S38	276	(drill\$ boring) and spiral and restriction and radius	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/13 08:42
S39	19	(drill\$ boring) and spiral and restriction and radius and "angular velocity"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/13 08:42
S40	5	(drill\$ boring) and spiral and restriction and radius and "angular velocity" and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/14 15:13
S41	244	"N" and polygonal and "angular velocity" and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/13 09:21
S42	13	"N" and polygonal and (spiral spiro spirograph) and "angular velocity" and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/13 09:24
S43	13	"N" and (N-polygonal polygonal) and (spiral spiro spirograph) and "angular velocity" and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/13 09:30
S44	6871	"N-2" and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/13 09:31
S45	0	"N(N-2)r" and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/13 09:31
S46	30	"N(N-2)" and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/13 09:31

S47	110	703/10.ccls.	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/13 09:48
S48	43	703/10.ccls. and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/14 15:00
S49	5	"5399056"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/14 14:34
S50	6	"SHIBAZAKI, MITSUHIRO" and "velocity"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/14 14:37
S51	26	"4084648"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/14 14:37
S52	4	703/10.ccls. and @pd < "19981001" and spir\$	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/14 15:02
S53	10	703/10.ccls. and @pd < "19981001" and model	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/14 15:03
S54	5	(drill\$ boring) and spiral and restriction and radius and "angular velocity" and @pd < "19981001" and (velocity angular angle rotate rotation rotating radius diameter polygon polygonal n-fold order drill drilling boring bored graph graphic hole dig characteristic dimension)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/14 15:19
S55	8443	(drill drilling boring) and (polygonal circle hole figure polygon graphic) and (revolve around) and model	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/14 15:22

S56	45	(drill drilling boring) and (polygonal circle hole figure polygon graphic) and (revolve around) and (simulate simulating simulation) and ((("703"/\$)).CCLS.)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/14 15:22
S57	277	(drill drilling boring) and (polygonal circle hole figure polygon graphic) and (revolve around) and "angular velocity" and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/14 15:25
S58	201	(drill drilling boring) and (polygonal circle hole figure polygon graphic) and (revolve around) and "angular velocity" and (bit head gimlet borer drill awl auger) and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/14 15:28
S59	69	(drill drilling boring) and (polygonal circle hole figure polygon graphic) and (revolve around) and "angular velocity" and (bit head gimlet borer drill awl auger) and ("n" "n-" "n ") and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/14 15:29
S60	64	(drill drilling boring) and (polygonal circle) and (revolve around) and ((("700").CLAS.) and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/15 13:01
S61	10	(drill drilling boring) and (triangular QUADRILATERAL PENTAGONAL HEXAGONAL octagonal) and (revolve around) and ((("700").CLAS.) and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/15 13:02
S62	226	(drill drilling boring) and (revolve around) and ((("700").CLAS.) and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/15 13:01
S63	113	(drill drilling bearing boring) and (triangular QUADRILATERAL PENTAGONAL HEXAGONAL octagonal) and ((("700").CLAS.) and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/15 13:19
S64	1	(drill drilling bearing boring) and triangular and QUADRILATERAL and PENTAGONAL and HEXAGONAL and octagonal and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/15 13:27

S65	0	(700/159.ccls700/184.ccls).CCLS.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/04/19 12:31
S66	202	(700/159).CCLS.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/04/15 13:28
S67	0	(700/159and"N").CCLS.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/04/15 13:28
S68	65	((700/159).CCLS.) and "N "	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/15 13:28
S69	28	((700/159).CCLS.) and "N " and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/15 14:05
S70	160	(700/173).CCLS.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/04/15 14:05
S71	87	((700/173).CCLS.) and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/16 08:46
S72	0	(700/(17318318718818919019119 2194)).CCLS.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/04/15 14:22
S73	908	((700/183) or (700/187) or (700/188) or (700/189) or (700/190) or (700/191) or (700/192) or (700/194)).CCLS.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/04/15 14:23

S74	1041	((700/173) or (700/183) or (700/187) or (700/188) or (700/189) or (700/190) or (700/191) or (700/192) or (700/194)).CCLS.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2004/04/15 14:23
S75	41	((((700/173) or (700/183) or (700/187) or (700/188) or (700/189) or (700/190) or (700/191) or (700/192) or (700/194)).CCLS.) and (vertex\$ cusp\$)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/15 14:25
S76	142104	(drill drilling bearing boring) and (polygonal figure circle) and (revolve around)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/15 14:34
S77	6672	(drill drilling bearing boring) and (polygonal figure circle) and (revolve around) and orbit\$	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/15 14:34
S78	297	(drill drilling bearing boring) and (polygonal figure circle) and (revolve around) and orbit\$ and "angular velocity"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/15 14:34
S79	206	(drill drilling bearing boring) and (polygonal figure circle) and (revolve around) and orbit\$ and "angular velocity" and radius	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/15 14:35
S80	13	(drill drilling bearing boring) and (polygonal figure circle) and (revolve around) and orbit\$ and "angular velocity" and radius and "N+1"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/15 14:35
S81	20	(drill drilling bearing boring) and (polygonal figure circle) and (revolve around) and orbit\$ and "angular velocity" and radius and ("N+1" "N-1" "N+2" "N-2")	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/15 14:36
S82	11	(drill drilling bearing boring) and (polygonal figure circle) and (revolve around) and orbit\$ and "angular velocity" and radius and ("N+1" "N-1" "N+2" "N-2") and @ad < "19991001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/19 11:40

S83	68	"roller cone" and "bit bearing" and @ad < "19991001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/15 15:04
S84	1335	("(N-1)" "(N+1)" "(1-N)") adj4 (r R radius)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/16 08:49
S85	292	("(N-1)" "(N+1)" "(1-N)") adj4 (r R radius) and model	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/16 08:49
S86	55	("(N-1)" "(N+1)" "(1-N)") adj4 (r R radius) and model and ("angular velocity" velocity)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/16 08:55
S87	132	(circle sphere spherical global circular) same (around revolve turn turning circumscribe) same (radius diameter momentum dynamic spin) and "angular velocity" and orbit	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/16 11:42
S88	30	(milling router scriber) and (bit drilling drill boring bear bearing) and (cutting cut drilling drill form) and (Figure graphic polygon polygonal) not (network networking internet connection communication) and (vertex side cusp) and "angular velocity"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/16 11:58
S89	16	(milling router scriber) and (bit drilling drill boring bear bearing) and (cutting cut drilling drill form) and (Figure graphic polygon polygonal) not (network networking internet connection communication) and (vertex side cusp) and "angular velocity" not (memory storage)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/16 11:59
S90	1	"3696695".PN.	USPAT	OR	OFF	2004/04/16 12:41
S91	1	"4083272".PN.	USPAT	OR	OFF	2004/04/16 12:42
S92	1	"4114486".PN.	USPAT	OR	OFF	2004/04/16 12:43
S93	1	"4264249".PN.	USPAT	OR	OFF	2004/04/16 13:35
S94	1	"4083272".PN.	USPAT	OR	OFF	2004/04/16 13:35
S95	1	"3835588".PN.	USPAT	OR	OFF	2004/04/16 13:37
S96	1	"3881378".PN.	USPAT	OR	OFF	2004/04/16 13:38

S97	1	"3913274".PN.	USPAT	OR	OFF	2004/04/16 13:38
S98	1	"3977279".PN.	USPAT	OR	OFF	2004/04/16 13:38
S99	1	"3977279".PN.	USPAT	OR	OFF	2004/04/16 13:38
S10 0	1	"3977279".PN.	USPAT	OR	OFF	2004/04/16 13:39
S10 1	1	"3977279".PN.	USPAT	OR	OFF	2004/04/16 13:40
S10 2	1	"3040607".PN.	USPAT	OR	OFF	2004/04/16 13:40
S10 3	1	"3881378".PN.	USPAT	OR	OFF	2004/04/16 13:41
S10 4	1	"3913274".PN.	USPAT	OR	OFF	2004/04/16 13:41
S10 5	1	"3079732".PN.	USPAT	OR	OFF	2004/04/16 13:41
S10 6	1	"3301104".PN.	USPAT	OR	OFF	2004/04/16 13:41
S10 7	1	"3881378".PN.	USPAT	OR	OFF	2004/04/16 13:42
S10 8	1	"3900971".PN.	USPAT	OR	OFF	2004/04/16 13:42
S10 9	1	"3913274".PN.	USPAT	OR	OFF	2004/04/16 13:43
S11 0	0	(drill drilling boring) and (polygonal circle) and (revolve around) and "angular velocity" and ("6584407".PN. three) adj (bit bits head drilling bear)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/19 14:09
S11 1	4	"1649858"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/19 14:22
S11 2	6	"1909078"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/19 14:23
S11 3	85	"3397928"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/19 14:23
S11 4	1	"0930759".PN.	USPAT	OR	OFF	2004/04/19 14:28
S11 5	1	"2571930".PN.	USPAT	OR	OFF	2004/04/19 14:29

S11 6	1	"3696876".PN.	USPAT	OR	OFF	2004/04/19 14:29
S11 7	1	"3696876".PN.	USPAT	OR	OFF	2004/04/19 14:29
S11 8	1	"4763736".PN.	USPAT	OR	OFF	2004/04/19 14:53
S11 9	10	"4763736"	USPAT	OR	OFF	2004/04/19 14:53
S12 0	406	"system level" and "component level"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/20 11:21
S12 1	31	"system level" and "component level" and "behavior model"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/20 11:10
S12 2	0	"system level" and "component level" and "behavior model" and @pd < "19991102"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/20 11:10
S12 3	31	"system level" and "component level" and "behavior model" and @ad < "20001102"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/20 11:12
S12 4	30	"system level" and "component level" and "behavior model" and @ad < "20001102" and ("machine learning" experience "AI")	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/20 11:15
S12 5	2452	CAE	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/20 11:16
S12 6	1	CAE and "behavior model" and @ad < "20001102" and ("machine learning" experience "AI")	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/20 11:26
S12 7	153	"system level" and "component level" and target	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/20 11:51

S12 8	37	"system level" and "component level" and target and @pd < "19991102"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/20 11:22
S12 9	8	CAE and "behavior model" and @ad < "20001102"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/20 11:27
S13 0	956	(system same level same (generat\$3 design\$3)) and (component element) and @pd < "19991102" and model and parameter\$1 and synthesis and (performance behavior)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/20 11:33
S13 1	63	(system same level same (generat\$3 design\$3)) and (component element) and @pd < "19991102" and model and (variable\$1 parameter\$1) and synthesis and (performance behavior) and "design parameter"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/20 11:40
S13 2	5813	(system product) same (element component) same level same (target spec specification requirement) and @pd < "19991102"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/20 11:54
S13 3	882	(system product) same (element component) same level same (target spec specification requirement performance predetermin\$5) same (parameter model variable) and simulat\$3 and (building determin\$3) @pd < "19991102" and behavior and ("703"/\$.ccls.) and ("machine learning" experimental AI "artificial intelligent") and (synthesis combination assembling mixing) and (cascaded hierachical hierachy) and (determin\$ build\$) and (range tolerance) and first and (second another) and (CAE "computer aided Engineering" CAD "computer aided design" computer-aided-design) and (vehical car) and "component level" and "system level"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/20 12:24

S13 4	0	(system product) same (element component) same level same (target spec specification requirement performance predetermin\$5) same (parameter model variable) and simulat\$3 and (building determin\$3) and @pd < "19991102" and behavior and ("703"/\$.ccls.) and ("machine learning" experimental AI "artificial intelligent") and (synthesis combination assembling mixing) and (cascaded hierachical hierachy) and (determin\$ build\$) and (range tolerance) and first and (second another) and (CAE "computer aided Engineering" CAD "computer aided design" computer-aided-design) and (vehical car)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/20 12:25
S13 5	0	(system product) same (element component) same level same (target spec specification requirement performance predetermin\$5) same (parameter model variable) and simulat\$3 and (building determin\$3) and @pd < "19991102" and behavior and ("703"/\$.ccls.) and ("machine learning" experimental AI "artificial intelligent") and (synthesis combination assembling mixing) and (cascaded hierachical hierachy) and (determin\$ build\$) and (range tolerance) and first and (second another)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/20 12:27
S13 6	0	(system product) same (element component) same level same (target spec specification requirement performance predetermin\$5) same (parameter model variable) and @pd < "19991102" and behavior and ("703"/\$.ccls.) and ("machine learning" experimental AI "artificial intelligent") and (synthesis combination assembling mixing) and (cascaded hierachical hierachy) and (determin\$ build\$) and (range tolerance)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/20 12:28

S13 7	4226	(system product) same (element component) same level same (target spec specification requirement performance predetermin\$5) same (parameter model variable)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/20 12:28
S13 8	3	(system product) same (element component) same level same (target spec specification requirement performance predetermin\$5) same (parameter model variable) and @pd < "19991102" and behavior and ("machine learning" experimental AI "artificial intelligent") and (synthesis combination assembling mixing) and (cascaded hierachical hierachy) and (determin\$ build\$) and (range tolerance)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/20 12:30
S13 9	6	(system product) same (element component) same level same (target spec specification requirement performance predetermin\$5) same (parameter model variable) and @ad < "20001102" and behavior and ("machine learning" experimental AI "artificial intelligent") and (synthesis combination assembling mixing) and (cascaded hierachical hierachy) and (determin\$ build\$) and (range tolerance)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/20 12:33
S14 0	94	(system product) same (element component) same level same (target spec specification requirement performance predetermin\$5) same (parameter model variable) and @ad < "20001102" and behavior and ("machine learning" experimental AI "artificial intelligent") and (synthesis combination assembling mixing)and (range tolerance)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/20 12:34
S14 1	38	drill same pattern same contour	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 08:28
S14 2	96	drill\$ same pattern same contour	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 09:34

S14 3	13	(drill\$ same pattern same contour) and angular	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 08:31
S14 4	11717	drill\$ same pattern	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 08:31
S14 5	0	(drill\$ same pattern) and point and countour and angular	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 08:32
S14 6	211	(drill\$ same pattern) and point and contour and angular	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 08:33
S14 7	705787	point same connect\$	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 08:34
S14 8	2213	(point same connect\$) and (drill\$ same pattern)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 08:36
S14 9	146	((point same connect\$) and (drill\$ same pattern)) and contour and (angular or rotation\$)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 08:43
S15 0	7	((((point same connect\$) and (drill\$ same pattern)) and contour and (angular or rotation\$)) and polygon\$	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 08:51
S15 1	1670	(drill\$3 boring bearing) adj pattern	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 08:55
S15 2	877	(drill\$3 boring bearing) adj pattern and (length radius)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 08:53

S15 3	14	(drill\$3 boring bearing) adj pattern and (length radius) and angular adj (speed velocity)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 08:53
S15 4	1165	(drill\$3 boring bearing) adj pattern and @ad < "19991001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 08:56
S15 5	1778	(drill\$3 boring bearing) adj (pattern figure path) and @ad < "19991001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 09:03
S15 6	20	((drill\$3 boring bearing) adj (pattern figure path) and @ad < "19991001") and "angular velocity"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 08:57
S15 7	767	(drill\$3 boring bearing) adj (pattern figure path) and @ad < "19991001" and (velocity speed frequency)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 09:03
S15 8	427	(drill\$3 boring bearing) adj (pattern figure path) and @ad < "19991001" and (velocity speed frequency) and (maximum max min minimum)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 09:04
S15 9	296	(drill\$3 boring bearing) adj (pattern figure path contour) and @ad < "19991001" and (velocity speed frequency) and (maximum max min minimum) and (revolve surround rotat\$4)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 09:16
S16 0	23	(drill\$3 boring bearing) adj (pattern figure path contour) and @ad < "19991001" and (velocity speed frequency) and (maximum max min minimum) and (revolve surround rotat\$4) and center adj point	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 09:06
S16 1	344	(drill\$3 boring bearing) adj (pattern figure path contour) and @ad < "19991001" and (velocity speed frequency) and (maximum max min minimum) and (revolv\$3 surround\$3 rotat\$4)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 09:17

S16 2	191	(drill\$3 boring bearing) adj (pattern figure path contour) and @ad < "19991001" and (velocity speed frequency) and (maximum max min minimum) and (revolv\$3 surround\$3 rotat\$4) and fixed	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 09:28
S16 3	0	("N(N-2)" "N(N+2)") and "angular velocity"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 09:29
S16 4	81	"N(N-2)" "N(N+2)"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 09:29
S16 5	6242833	"N(N-2)" "N(N+2)"and (radius r diameter)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 09:30
S16 6	59	("N(N-2)" "N(N+2)") and (radius r diameter)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 09:30
S16 7	22	("N(N-2)" "N(N+2)") and (radius r diameter) and (revolv\$3 rotat\$ surround\$3)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 09:31
S16 8	70	drill\$ same pattern same contour and @ad < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 09:41
S16 9	10	"6496008"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 09:41
S17 0	1	"4029444".PN.	USPAT	OR	OFF	2004/04/26 10:21
S17 1	1	"3895610".PN.	USPAT	OR	OFF	2004/04/26 10:21
S17 2	1	"3492974".PN.	USPAT	OR	OFF	2004/04/26 10:22
S17 3	1	"3464361".PN.	USPAT	OR	OFF	2004/04/26 10:22

S17 4	138	"SHIBAZAKI, MITSUHIRO"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 12:55
S17 5	94	hypotrochoid	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 13:58
S17 6	72	hypotrochoid and @ad < "19991001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 13:51
S17 7	1	"5067456".PN.	USPAT	OR	OFF	2004/04/26 13:34
S17 8	1	"3253580".PN.	USPAT	OR	OFF	2004/04/26 13:34
S17 9	1	"3226013".PN.	USPAT	OR	OFF	2004/04/26 13:35
S18 0	1	"3253580".PN.	USPAT	OR	OFF	2004/04/26 13:37
S18 1	1	"3226013".PN.	USPAT	OR	OFF	2004/04/26 13:38
S18 2	9	"2947290"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 13:54
S18 3	2	"2988056"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 13:55
S18 4	20	"3226013"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 13:57
S18 5	3181	"rotary piston engine"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 13:58
S18 6	8	"rotary piston engine" and hypotrochoid	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/26 13:59

S18 7	42	"5297057"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/27 12:03
S18 8	26	"5043929"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/27 12:03
S18 9	314	"rock bit" and pattern	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 07:54
S19 0	7	"rock bit" and pattern and orbit\$3	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 07:56
S19 1	42	"rock bit" and pattern and ("eq" "equation")	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 12:51
S19 2	16116	("rock bit" drilling bearing boring) and (pattern figure hole) and ("eq" "equation") and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 12:53
S19 3	2046	("rock bit" drilling bearing boring) and (pattern figure hole) and ("eq" "equation") and simulat\$3 and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 12:53
S19 4	1756	("rock bit" drilling bearing boring) and (pattern figure) and ("eq" "equation") and simulat\$3 and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 12:53
S19 5	0	("rock bit" drilling bearing boring) and (pattern figure hole) and ("eq" "equation") and simulat\$3 and applet and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 12:54
S19 6	797	("rock bit" drilling bearing boring) and (pattern figure hole) and ("eq" "equation") and simulat\$3 and velocity and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 12:54

S19 7	1458	("rock bit" drilling bearing boring) and (pattern figure hole) and ("eq" "equation") and simulat\$3 and (velocity speed) and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 12:55
S19 8	541	("rock bit" drilling bearing boring) and (pattern figure hole) and ("eq" "equation") and simulat\$3 and (velocity speed) and radius and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 12:55
S19 9	963	("rock bit" drilling bearing boring) and (pattern figure hole) and ("eq" "equation") and simulat\$3 and (velocity speed) and (radius diameter) and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 13:01
S20 0	8	("rock bit" drilling bearing boring) and (pattern figure hole) and ("eq" "equation") and simulat\$3 and (velocity speed) and (radius diameter) and @pd < "19981001" and "1-N"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 12:56
S20 1	233	("rock bit" drilling) and (pattern figure hole) and ("eq" "equation") and simulat\$3 and (velocity speed) and (radius diameter) and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 13:15
S20 2	183	("rock bit" drilling) and (pattern figure) and ("eq" "equation") and simulat\$3 and (velocity speed) and (radius diameter) and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 13:02
S20 3	5	"rock bit" and (pattern figure hole) and ("eq" "equation") and simulat\$3 and (velocity speed) and (radius diameter) and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 13:29
S20 4	1	"eulerian transformation" and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 13:29
S20 5	43	eulerian and transformation and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 13:30
S20 6	63	eulerian and transform\$5 and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 13:33

S20 7	0	eulerian adj2 transform\$5 and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 13:33
S20 8	27	eulerian same transform\$5 and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 13:33
S20 9	42	eulerian same (equation transform\$5) and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 13:40
S21 0	1	eulerian same (equation transform\$5) and @pd < "19981001" and drill\$4	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 13:35
S21 1	4	eulerian same (equation transform\$5) and @pd < "19981001" and (rotary boring drill\$3 bearing)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 13:36
S21 2	86	eulerian and (equation transform\$5) and @pd < "19981001"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 13:41
S21 3	14	eulerian and (equation transform\$5) and @pd < "19981001" and (rotary boring drill\$3 bearing)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 13:45
S21 4	72	(eulerian and (equation transform\$5) and @pd < "19981001") not (eulerian and (equation transform\$5) and @pd < "19981001" and (rotary boring drill\$3 bearing))	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 14:36
S21 5	0	"rock bit" adj2 design and equation	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/06/07 15:22
S21 6	30	"rock bit" adj2 design	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 14:42

S21 7	314	"rock bit" and pattern	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 14:42
S21 8	42	"rock bit" and pattern and equation	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/04/29 14:42
S21 9	2	"06304805"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/06/07 15:28
S22 0	4	"1618900"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/06/07 15:30
S22 1	6	"2586084"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2004/06/07 15:30
S22 2	8	("RE26383" "1241176" "2586084" "2976027" "3036821" "3199496" "3771501" "3922120").PN.	USPAT	OR	ON	2004/06/07 15:34
S22 3	19583	boring same (figure hole)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2005/01/10 14:15
S22 4	4855	drilling adj bit	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2005/12/02 14:07
S22 5	10732	(drilling boring) adj (bit head)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2005/12/02 14:08
S22 6	0	(drilling boring) adj (bit head) and square and triangle and pentagon	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2005/12/02 14:08

S22 7	0	(drilling boring) adj (bit head) and square and triangle and pentagon\$4	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2005/12/02 14:09
S22 8	313	(drilling boring) and square and triangle and pentagon\$4	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2005/12/02 14:09
S22 9	0	(drilling boring) and (square and triangle and pentagon\$4) near2 (figure polygon\$3 hole)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2005/12/02 14:09
S23 0	2149	(drilling boring) and (square triangle pentagon\$4) near2 (figure polygon\$3 hole)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2005/12/02 14:10
S23 1	144	(drilling boring) and (square and triangle pentagon\$4) near2 (figure polygon\$3 hole)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2005/12/02 14:20
S23 2	16	"4074778"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2005/12/02 14:20
S23 3	9	("4074778").URPN.	USPAT	OR	ON	2005/12/02 14:26
S23 4	14	("1241176" "2586084" "2976027" "3036821" "3199496" "3771501" "3922120" "RE26383").PN.	US-PGPUB; USPAT; USOCR	OR	ON	2005/12/02 14:30
S23 5	0	"299/\$".ccls.	US-PGPUB; USPAT; USOCR	OR	ON	2005/12/02 14:30
S23 6	15723	"299"/\$.ccls.	US-PGPUB; USPAT; USOCR	OR	ON	2005/12/02 14:31
S23 7	20	"299"/\$.ccls. and multiple adj (bit head borer)	US-PGPUB; USPAT; USOCR	OR	ON	2005/12/02 14:33
S23 8	0	405/233.ccls. and multiple adj (bit head borer)	US-PGPUB; USPAT; USOCR	OR	ON	2005/12/02 14:33

S23 9	316	405/233.ccls.	US-PGPUB; USPAT; USOCR	OR	ON	2005/12/02 14:36
S24 0	271	175/91.ccls.	US-PGPUB; USPAT; USOCR	OR	ON	2005/12/06 12:05